Manual Update

The latest technical changes since the publication of our 1985 editions.

Revisions to your 1985 Auto Repair Manual are as follows:

AMERICAN MOTORS CHAPTER

Refer to the "4-150 Engine Section," page 2A–21, and attach the following Service Bulletin to the Cylinder Head, Replace procedure.

SERVICE BULLETIN

Some cylinder head bolts used on the spark plug side of the cylinder head were improperly hardened and may break under the bolt head or in the thread area. Engines that may have these bolts are coded 310U06 thru 310U14. The code is stamped on a machined surface on the distributor side of the block.

If a broken head bolt is found, all bolts on spark plug side of engine should be replaced with new bolts PN 400 6593. Refer to step 7 when installing bolts.

1982–85 CAVALIER • CIMARRON • FIRENZA • SKYHAWK • SUNBIRD • 2000 CHAPTER

Refer to the "4-112 & 121 Overhead Valve Engine Section," page 2G–189, and attach the following Service Bulletin to the Cylinder Head, Replace procedure.

SERVICE BULLETIN

Some 1983–84 vehicles with 4-121 engines may experience coolant loss due to a cracked cylinder head. A crack can develop across the No. 6 intake valve spring seat and continue across and behind the No. 4 and 5 exhaust valve seats, Fig. 3A. The crack may not be visible without a dye check. Revised castings were manufactured after Julian code date D-12-4. The date code is located behind the No. 2 and 3 valve spring seats, Fig. 3B.

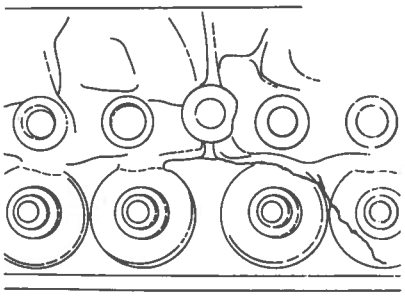

Fig. 3A Likely location of cylinder head crack. 4-121 engines

CAMARO • CHEVROLET • CORVETTE • MALIBU • MONTE CARLO • NOVA CHAPTER

Refer to "Gasoline Engine Section," page 2G–120, and attach the following Service Bulletin to the Crankshaft Rear Oil Seal, Replace procedure.

1985 CITATION • OMEGA • PHOENIX • SKYLARK CHAPTER

Refer to the "Engine Section," page 2G–229, and attach the following Service Bulletin to the Rear Main Bearing Seal Repair procedure.

SERVICE BULLETIN

Crankshaft and seal replacement may be necessary to stop oil leakage from the area of the rear main crankshaft seal. A new crankshaft PN 14089826, which has had the knurled portion of the rear seal area removed, is available to service 1982–84 V6-173 engines. The crankshaft uses rear seal PN 14081761 and requires anaerobic sealer Loctite 515 or equivalent. The one-piece seal has helices on the lip and a garter spring. Install seal as follows:

1. Drain engine oil and coolant, remove engine and mount on suitable stand.
2. Remove old crankshaft.
3. Remove old oil seal and clean all sealant and foreign material from engine block and rear bearing cap.
4. Inspect components for nicks, burrs, scratches, and machining defects at all sealing and mating surfaces and crankshaft journals.
5. Apply .039 inch wide bead of anaerobic sealant to outside circumference of new seal with seal in place on installation tool as received in kit.
6. Push seal and tool as an assembly as far on to new crankshaft as possible. Position tool so arrow points toward engine block assembly as shown in instructions included with seal kit.
7. Apply light coat of engine oil supplement PN 1052376 on crankshaft journals.
8. With tool in place, position crankshaft in engine taking care to align seal in case groove.
9. Rotate and remove installation tool.
10. Apply thin coat of anaerobic sealant to areas of rear main bearing cap as shown in Fig. A. The rear main bearing cap must be properly sealed to prevent an oil leak between the block and cap. The use of too much sealer on the rear main cap can result in a seal failure and oil leak. RTV sealant should not be substituted as it will cause an oil leak. Install main cap and torque bolts to 70 ft. lbs.
11. Install remaining caps and bearings and torque bolts to 70 ft. lbs.
12. Install connecting rods, bearings and caps.
13. Complete engine assembly and installation.

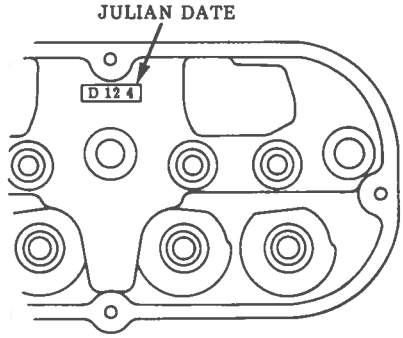

Fig. 3B Location of Julian date code. 4-121 engines

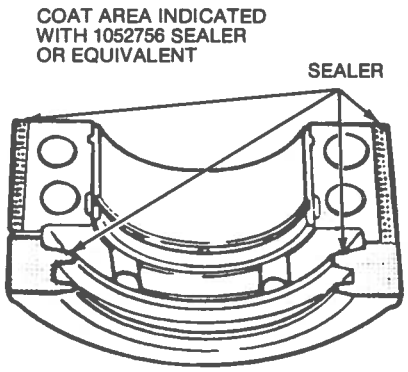

Fig. A Applying sealer to rear main bearing cap. V6-173 engines

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